

REMARKS

The applicant acknowledges with thanks the Examiner's indication that claims 7 to 10, 15, 16, 19 and 20 would be allowable if rewritten in independent form, including the limitations of the base claim and any intervening claims.

Claim Rejections Under The Prior Art

By the January 14, 2004 office action, the Examiner has rejected claims 1 to 6, 11 to 14 and 17 to 18 as amended on October 21, 2003 under paper no. 4, under per 35 U.S.C. §103(a) as obvious from the teachings of U.S. Patent No. 5,503,609 to Bull in view of the combined teachings of United States Patent No. 5,222,928 to Yacullo and United States Patent No. 4,911,430 to Flament.

i) U.S. Patent No. 5,503,609 to Bull

The Examiner identifies Bull as teaching an exercise apparatus which includes a pair of shuttles which include a frame for supporting a foot of a user standing in a generally forward facing position thereon and a guiding mechanism and a guide rail assembly extending in a direction away from each other in a substantially mirror arrangement from the midpoint of the rail assembly to distal ends. The Examiner further indicates Bull as teaching guiding mechanisms for guiding the associated shuttle in movement along one of the rail assemblies between proximal or midpoint ends and a distal end, whereby alternating reciprocal movement moves the user's feet in substantially reciprocating movement.

The Examiner admits that Bull fails to teach or suggest a rail assembly moving downwardly from the proximal end to the distal end. The Examiner further admits that Bull also does not show guide rail assemblies which extend rearwardly from a proximal end to the distal end (see office action page 3, lines 3 and 4) for example, is recited in each of present independent claims 1, 11 and 17.

ii) U.S. Patent No. 5,222,928 to Yacullo

The Examiner has identified Yacullo as teaching an analogous device including a guide rail assembly comprised of two mirror image guide rails, 15,16 attached a proximal end, and which extend downwardly towards respective distal ends, and a pair of shuttles. The Examiner concludes that as Yacullo teaches that it is desirable to have A-frame guide rails in order to provide greater exercise benefits during use, it would have been obvious to one having ordinary skill in the art to have the guide rails of Bull configured as the guide rails of Yacullo in an A-shaped configuration so as to extend downwardly.

iii) U.S. Patent No. 4,911,430 to Flament

The Examiner relies on Flament as teaching in Figure 2 and the Abstract an analogous device including a pair of shuttles on a curved guide assembly, wherein the ends of the guide assembly are rearward from the centre of the guide assembly. The Examiner concludes that Flament teaches that it is desirable to have such a configuration in order to better imitate actual

motions during skiing or skating [emphasis added], with the result that it would have been obvious to one skilled in the art at the time of the invention to have the guide rail assembly of Bull as modified by Yacullo further modified to have distal ends that are rearward of the proximal end point to better mimic motions made during actual “skiing or skating [emphasis added]”.

Present Invention

With the utmost respect, it is believed that the Examiner has misinterpreted the teachings of the Bull and Flament references in combining the partial teachings of the disclosed apparatus to arrive at the claimed invention.

As indicated, each of present independent claims 1, 11 and 17 (and claims 2 to 5, 12 to 14 and 18 which ultimately depend thereon) are believed to recite subject matter of patentable merit over the applied references either alone or in combination. With the claimed apparatus recited in each of independent claims 1, 11 and 17 the invention seeks to provide an apparatus which is adapted to simulate a natural skating or rollerblading movement (page 1, paragraph 2). The applicant has appreciated that the claimed invention including guide rail or guide assemblies which extend in a direction away from each other from a forward proximal end, and which extend rearwardly to a lower distal end portion advantageously assists in mimicking a person's natural forward glide which occurs when skating or rollerblading. Furthermore, it is believed

that the combination of elements which are presently recited and the advantages obtained thereby are in no way taught or suggested from the teachings of the combined patents.

(i) Bull

As admitted by the Examiner, Bull teaches an exercise device which includes a pair of shuttles which are solely adapted for lateral movement in a straight line along laterally extending tracks 54,55. Although the Examiner indicates it would be obvious to modify the track of Bull to adapt the A-frame shape of Yacullo, it is believed that Bull, in fact, teaches directly away from such a construction. In particular, Bull explicitly describes the apparatus at column 6, lines 60 onwardly wherein the tracks 54,55 are indicated as lying in a horizontal plane. Bull teaches that this construction "allows for a continuous, dynamic, repetitive, smooth flow of energy from the athlete to the exercise apparatus by outward thrust of the user's leg". It seems plausible that a significant divergence from the horizontal plane taught by Yacullo would adversely affect the smooth flow of energy, thus contradicting the desired objectives of the Bull apparatus.

(ii) Yacullo

With respect to Yacullo '928 patent, Yacullo is directed to an exercise apparatus which includes a pair of foot rests 17, and an A-frame shaped base 11 along foot rests 17. The foot rests 17 of Yacullo are configured to provide a top surface 19 which is oriented generally parallel to the bottom of the A-frame base (see column 2, line 30). In the operation of Yacullo, the foot rests, thus move in a linear plane along opposite sides of the A-frame base, traveling along each

planar side surface. The A-frame shape of the Yacullo apparatus is operable to produce increased workload demands that for example would be ideally suited for muscle toning (see column 1, lines 24). This fitness objective is contrasted from both Bull and the goals of a skating device whose primary objective is to provide natural rhythmic skating movement which for example gives cardiovascular benefits. The objective of the present invention that uses the combination of downward and rearward motion is to provide a sensation of forward motion that is achieved in the skating movement.

It is believed that Yacullo is in fact non-analogous art, insofar as it is directed to an exercise and toning apparatus, as contrasted with the skating-type apparatus of Bull and the present invention which operates to provide cardiovascular benefits.

(iii) Flament

The Examiner has identified Flament as disclosing an apparatus for simulating skating movement (see Office Action page 3, line 8). It is believed on a fair reading, Flament in fact is directed to an apparatus for simulating skiing movement which seeks to provide different motion from that in the present case.

Flament is specifically described as a muscle training apparatus for training in sliding sports such as snow or water skiing (see for example abstract, lines 1, 2 or 3). It is believed that

this motion and apparatus readily distinguishes from the skating motion which is achieved by the present invention.

In particular, a person's skiing motion, as contrasted with a skating or rollerblading motion, necessitates that the user moves and/or lifts his or her legs primarily sideways. The ski edges are turned inwardly in turning, in stopping and in side-to-side movement as one moves down a ski hill under gravity (or forward by the pull of a boat during water skiing). Furthermore, the emphasis during skiing is to maintain control and balance during movement which is achieved by shifting of the body weight laterally with minimal extension of the legs. In contrast, skating emphasizes the need to generate momentum and move forward which is achieved by extending each leg rearwardly and downwardly.

As shown best in Figure 3, to achieve the edge turning, Flament includes a pair of paths 5,6 formed by curved concentric rails 11,12 (see Figures 6 and 7) along which a pair of carriages move. As shown best in Figure 3, the rails 11,12 curve upwardly at each end away from a midpoint of the apparatus, in direct contrast to the claimed construction. As disclosed at column 3, lines 60 to column 4, lines 7, Flament advantageously achieves a snow or water skiing simulation by raising the ends of the rail to add resistance to lateral movement. The objective of the raised edge is to allow a beginning skier to train him/herself in taking "the edge" as for example to achieve a staircase skiing technique. In contrast, the presently claimed structure achieves a skating movement where, for example, a user's forward momentum will naturally

result with the foot used to apply thrust, moving rearward and downward relative to the skater's body.

Accordingly, it is believed that the apparatus of Flament is directed to a different objective and different exercise motion than that which is achieved by the claimed apparatus so as not to constitute an analogous device. Insofar as the Flament guide rails 11,12 are raised at the ends, it is believed that the Examiner's deconstruction and combinations of isolated features of Flament with selected teachings of Yacullo and Bull is not something that would have been obvious to a person skilled in the art. In this regard, the Examiner is respectfully referred to the decision *Ex parte Hiyamizu*, 10 USPQ 2d 1393, 1394-95 (B.P.A.I 1998):

"Under 35 U.S.C. 103 where the examiner has relied on the teachings of several references, the test is whether or not the references viewed individually and collectively would have suggested the claimed invention to the person possessing ordinary skill in the art. It is to be noted, however, that citing references which merely indicate that isolated elements and/or features recited in the claims are known is not a sufficient basis for concluding that the combination of claimed elements would have been obvious... Furthermore, it is well settled that where the claimed invention solves a problem, the discovery of the source of the problem and its solution are considered to be part of the "invention as a whole" under 35 U.S.C. 103". [emphasis added]

In the present case, the discovery of the source of a problem, namely, an exercise apparatus which is selected to achieve a skating or rollerblading movement, as well as the solution achieved by the downward, rearward movement of the user's foot is not suggested by

the prior art. Rather, it is believed that the cited references, at best, merely indicate isolated elements and/or features recited in the claims. Bull discloses an apparatus in which the guide track is explicitly described as horizontal. Yacullo discloses an exercise and toning device without identifying any specific types of skating/skiing activity to be mimicked. Flament is directed to a skiing device in which the rails are raised at their distal ends in precisely the opposite manner as claimed. It is believed that the Examiner's reliance on partial and isolated teachings from three separate applied references is not a sufficient basis for concluding that the combination of claimed elements would have been obvious.

Furthermore, the Examiner is respectfully referred to the decision *Ex parte Clapp*, 227 USPQ 972,973 (B.P.A.I. 1985) where at page 973, the following was stated:

"In the instant application, the examiner has done little more than cite references to show that one or more elements or subcombinations thereof, when each is viewed in a vacuum, is known. The claimed invention, however, is clearly directed to a combination of elements. That is to say, appellant does not claim that he has invented one or more new elements but has presented claims to a new combination of elements. To support the conclusion that the claimed combination is directed to obvious subject matter, either the references must expressly or impliedly suggest the claimed combination or the examiner must present a convincing line of reasoning as to why the artisan would have found the claimed invention to have been obvious in light of the teachings of the references.... Based upon the record before us, we are convinced that the artisan would not have found it obvious to selectively pick and choose elements or concepts from the various references so as to arrive at the claimed invention without using the claims as a guide. It is to be noted that simplicity and

hindsight are not proper criteria for resolving the issue of obviousness. [emphasis added]

On page 2 of the Office Action, the Examiner indicates that it would have been obvious to one of ordinary skill at the time of the invention to modify the guide assembly of Bull, further to move the distal ends rearward of the proximal midpoint in order to better mimic motions made during actual skating or skiing. Bull was originally filed in full view of the Flament and Yacullo inventions and not only is there no teaching or suggestion involved in forming the guide rail assembly as proposed by the Examiner, but rather in direct contrast, Bull explicitly teaches the guide rail as extending horizontally. Secondly, Flament also teaches directly away from the Examiner's proposed combined teachings with Yacullo, insofar as the distal ends of the tracks are identified as advantageously curving upwardly to facilitate the simulated stop achieved by skiing, (as contrasted with the forward propulsion movement achieved in skating). Flament is not only silent with respect to the possibility of simulating an athlete's natural skating or rollerblading movement during forward motion (see page 2, last two lines of present disclosure), but achieves the movement in precisely an opposite manner to that claimed.

Accordingly, at least for the aforesaid reasons, it is submitted that Bull neither alone or in combination with Flament and/or Yacullo would lead a person skilled in the art without difficulty to the presently claimed invention. There is no suggestion nor advantage which is expressly or impliedly achieved by combining the teachings of the three references. Accordingly, it is respectfully submitted that each of independent claims 1, 11 and 17 recite

subject matter of patentable merit and the Examiner is respectfully requested to reconsider and withdraw his objection in this regard.

Dependent Claims 2 to 6, 12 to 14 and 18

It is respectfully submitted that the dependent claims recite patentably distinguishable subject matter over the Bull, Yacullo and/or Flament references at least for the aforestated reasons.

If for any reason the Examiner is of the view that this application is not now in condition for allowance, the Examiner is requested to telephone the undersigned at 1-416-961-5000, so that an interview may be arranged to expedite the allowance of this case.

Respectfully submitted,

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Enclosure
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